SAFETY GUIDELINES FOR FIELDWORK

1. PURPOSE

1.1. The intent of this Animal Care and Use Procedure (ACUP) is to describe the most appropriate safety precautions and personal protective equipment (PPE) that should be used when handling wildlife in the field (i.e., a natural environment outside of Cornell facilities). This ACUP is approved by the Cornell Institutional Animal Care and Use Committee (IACUC). Any deviation must be approved by the IACUC prior to its application.

2. SCOPE

2.1. This ACUP is intended for use by all Cornell University personnel (e.g., faculty, support staff, students, and visitors) who will be participating in fieldwork activities.

3. INTRODUCTION

3.1. It is an individual’s responsibility to ensure proper personal protective equipment (PPE) and safety standards are maintained at all times while working in the field. The principal investigator (PI) is responsible for ensuring that all personnel are properly trained in the usage of PPE and that this ACUP and project-specific safety guidelines are adhered to while working under IACUC-approved protocols. Field study protocols may require specific variations from this ACUP. All protocol specific safety guidelines must be provided to, and understood by, applicable personnel before fieldwork may commence. Contact CARE at care@cornell.edu for more information or for assistance.

4. MATERIALS AND EQUIPMENT

4.1. PPE (e.g., gloves, mucous membrane protection, respirator, outer protective clothing, boots or closed-toe shoes)

4.2. First Aid Kit

4.2.1. Contents must include:

4.2.1.1. Antiseptic or antiseptic impregnated sterile pads
4.2.1.2. Sterile gauze pads
4.2.1.3. Adhesive medical tape
4.2.1.4. Bandages
4.2.1.5. Protective gloves (e.g., latex, vinyl, or nitrile)

4.3. Communication / Locator Devices for emergency communication (e.g., cellular phone, radio, walkie-talkie, satellite phone, GPS)
4.4. Hand hygiene products
4.5. Insect repellents and supplies/clothing to prevent contact with biting insects

5. PROCEDURES

5.1. PPE

5.1.1. Follow any recommendations addressed by Cornell’s Animal Users Health and Safety Program (AUHSP) for project-specific PPE requirements.

5.1.2. Put on proper PPE before beginning the fieldwork.

5.1.2.1. Wear protective gloves for direct handling of any animal that presents a significant health risk to the handler, either because of the animal itself or the health condition of the handler (e.g., AUHSP High Risk and some Moderate Risk protocols).

5.1.2.2. Utilize greater levels of PPE when there is a higher potential of exposure to zoonotic agents. For example, use mucous membrane protection (e.g., safety glasses or a full face mask) when there is a risk for hazardous fluid contact with eyes, nose, or mouth.

5.1.3. When done with applicable procedures, remove PPE in a manner that minimizes the chance of self-contamination (e.g., take gloves off only after removing other contaminated PPE).

5.1.4. Use safety equipment under extenuating circumstances (e.g., leather gloves for fractious or aggressive animals, helmets in applicable situations, snake-proof chaps or leggings in regions with high venomous snake concentrations).

NOTE: Gear that is brought to multiple field sites can transmit pathogens to naïve populations. As such, equipment used on multiple locations should be cleaned and disinfected prior to transport.

5.2. Hygiene Practices

5.2.1. Practice proper hand hygiene after handling animals or other items that are contaminated with their dander, feces, or body fluids.

5.2.1.1. Clean and sanitize hands thoroughly before eating, drinking, using tobacco products, or applying makeup/contact lenses, and especially after working with animals and equipment in the field.
5.3. **Injuries**

5.3.1. Encourage all personnel to be trained in basic first aid techniques. Consider whether Wilderness First Aid and/or Wilderness First Responder training may be appropriate for your field safety study. Visit Cornell Outdoor Education Emergency Care Courses site for more information: http://www.coe.cornell.edu/goto.jsp?programarea=emergency.care

5.3.2. Maintain a fully stocked first aid kit at all times when in the field setting.

5.3.2.1. The PI or their designee is responsible for maintaining the first-aid kit and assuring that none of the items are expired.

5.3.3. If an injury occurs, pursue medical evaluation and care at the nearest medical facility and contact Gannett Occupational Medicine office (607-255-6960) for follow up. Additionally, ensure that the PI is made aware of any injuries.

5.3.4. Refer to ACUP 707 Animal Related Injury for more information on injuries resulting from animals.

5.4. **Communication**

5.4.1. Provide a detailed schedule and travel plans to a secondary responsible party prior to performing field work.

5.4.2. Maintain open lines of communication via communication devices with the secondary responsible party while in the field.

5.4.3. Work with a partner in the field whenever possible.

5.4.4. Have local emergency numbers readily available.

5.5. **Zoonotic Diseases**

5.5.1. Zoonotic diseases are a concern when working in any field setting.

5.5.1.1. Consult with Gannett Health Services or other human health professionals about vaccination/prevention if there is increased risk of pathogen exposure in the field setting.

5.5.2. Consult the Travel Medicine Clinic at Gannett for information on immunization requirements as well as other health education resources for domestic and international travel.

5.5.3. Consult human health professionals immediately if any zoonotic disease exposure is suspected.

5.5.4. Refer to the Centers for Disease Control and Prevention Rabies web page for specific rabies information.

5.5.5. Refer to the CARE Zoonoses web page for zoonotic concerns regarding contact with different species in the field.

5.5.6. Refer to ACUP 710 Working with Wild Rodents if your study includes working with wild rodents.
5.6. Vector-Borne Disease

5.6.1. Vector-borne diseases are a concern when working in any field setting.

5.6.1.1. Arthropods such as ticks, mosquitoes, and fleas can carry pathogens that cause diseases such as Lyme disease, West Nile Virus, malaria, and plague. Vaccines, antibiotics, and / or cures are not available for many diseases, so bite prevention is critical.

5.6.1.2. Refer to the Centers for Disease Control and Prevention's Diseases and Conditions A-Z index page for specific disease information.

5.6.1.3. Wear long-sleeved shirts, pants, socks, and shoes to prevent insect bites and consider a hat with a mosquito net over it to prevent facial and neck bites.

5.6.1.4. Consider wearing insect repellent and follow all recommendations on the product labels, especially if using one that contains DEET.

5.6.1.5. Check your body for ticks.

5.6.1.5.1. Contact Gannett or nearest medical facility if you find them embedded in your skin.

5.6.1.6. Contact Gannett or your personal physician if you experience any signs or symptoms such as a rash, flu-like illness, fever, or headaches at any time during, or upon return from, your field study.

5.7. International Travel Support

5.7.1. Contact Cornell's International Gateway website at http://international.cornell.edu and click on “Travel Resources” or international medical, safety, and travel assistance and information.

5.7.2. Register through MEDEX for emergency assistance while abroad at http://international.cornell.edu/emergencies.

5.8. Firearms and Air Rifles

NOTE: All Cornell personnel who may use gunshot (e.g., firearms or air rifles) for euthanasia of vertebrates under an animal use protocol must be certified as proficient. Proficiency can be tested via the Cornell Museum of Vertebrates (CUMV). Please contact the Cornell IACUC office for more details and scheduling. Cornell personnel using firearms must also complete a safety training course and, if the researcher lacks a government-sanctioned safety certification, safety training and certification can also be arranged through the CUMV. Please note, safety training may take many months to coordinate.

5.8.1. Use of firearms and air rifles is limited to euthanasia of wild free-ranging animals, must be approved by Cornell’s IACUC, and is further limited to areas where discharge of firearms is lawful and permission of the landowner and all necessary state and federal permits have been obtained.

5.8.2. Exercise extreme caution so as to not cause personal injury.
5.8.3. Choose an appropriate firearm / air rifle and ammunition based on species and situation. Refer to the 2013 Edition of the AVMA Guidelines for the Euthanasia of Animals for specific details.

5.8.4. The preferred target area is the head, with the goal being penetration and destruction of brain tissue.

5.8.4.1. A gunshot to the heart or neck does not immediately render animals unconscious and thus is not considered an appropriate primary target.

6. PERSONNEL SAFETY

6.1. Medical Emergencies: CALL 911.

6.2. When working with animals wear appropriate PPE, observe proper hygiene, and be aware of allergy, zoonosis, and injury risks. Refer to the CARE Occupational Health and Safety webpage for more information.

6.3. Firearms – users must successfully complete a safety course before using firearms as a means of euthanasia.

6.4. Contact Cornell’s EH&S Biosafety (607-255-8200) for more information, assistance, and training tailored to specific field safety needs, risks, and concerns.

7. ANIMAL RELATED CONTINGENCIES

7.1. Treat injuries to animals as per protocol specifics.

7.2. Non-emergency veterinary questions, email CARE veterinary staff at care@cornell.edu.

8. REFERENCES

8.1. Occupational Medicine at Gannett Health Services, (607) 255-6960 or http://www.gannett.cornell.edu/services/occupational/index.cfm

8.2. Travel Medicine Clinic at Gannett, (607) 255-5155 or http://www.gannett.cornell.edu/services/medical/travel_clinic.cfm

8.3. Cornell Outdoor Education Emergency Care Courses: http://www.coe.cornell.edu/goto.jsp?programarea=emergency.care


8.5. Centers for Disease Control and Prevention Rabies Information: http://www.cdc.gov/rabies/


9. APPENDIX

9.1. None

10. HISTORY

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